

REMARKS/ARGUMENTS

Claims 1, 2, 4, 5, 7, 8, and 13 are active.

Claim 1 is amended to incorporate, now cancelled, Claims 3 and 6. Support for Claim 1 and new Claim 13 can also be found in Example 2.

The specification at page 1 is amended to provide a cross-reference to the earlier filed PCT application to which the present 371 application claims benefit.

No new matter has been added.

The thermoplastic polymer powder comprising an acrylic triblock copolymer (I) of the present invention is obtained by an underwater cutting process(see amended claim 1).

This is advantageous because the underwater cutting process (see Example 2, also paragraph [0059] of the PG-PUB of the present application) enables the acrylic block copolymer (I) composition preparation and simultaneous manufacturer into a powder by use of an extruder(see [00611 Of US 2006/0036030). Furthermore, the extruded product is oriented to a high degree by shearing applied at the time of the extrusion from the micro-dice used in the underwater cutting process. Accordingly, the powder obtained is less agglutinated and has excellent powder fluidity.

As a point of comparison data are presented in the attached Rule 132 Declaration from a named inventor Toyoaki Kurihara.

In the experiments described in this Declaration, the thermoplastic polymer powder was obtained by the procedures of Example 1 and 2.

The powder fluidity was measured in accordance with JIS R 9301-2-2.

As shown in the table presented at page 2, the powder obtained by cutting in Example 2 has an excellent powder fluidity compared with the powder obtained by pulverizing in Example 1.

There are several prior art based rejections outlined in the Official Action. In short, it is requested that these rejections be reconsidered and withdrawn because (1) the citations do not describe a triblock copolymer (B)(A)(B) as defined; and (2) the citations do not describe a thermoplastic powder obtained by an underwater cutting process as claimed.

The rejections based on Matyjaszewski et al. (US6,627,314) are respectfully traversed.

Matyjaszewski does not describes (A) the thermoplastic polymer powder comprising an acrylic triblock copolymer (I) and (B) the thermoplastic polymer powder obtained by an underwater cutting process of the present invention. Matyjaszewski describes preparing nanocomposite particles and structures by polymerizing monomers onto a functional inorganic colloid comprising a initiation site, and Matyjaszewski in Example 11 describes p(BA-b-MMA) particles which pass through a 0.2 micron filter (see ABSTRACT and Example 11).

Therefore, the amended claims are not anticipated by or obvious over Matyjaszewski et al. Withdrawal of the rejection is requested.

The rejections based on Such et al. (US2006/0223936) are respectfully traversed.

Such does describe a specific method for preparing an aqueous dispersion of polymer particles and Example 1b of the patent application describes preparing poly(butyl acrylate-co-methylmethacrylate) latex using the macro-RAFT agent (see ABSTRACT and Example 1b of US2006/0223936). This is not, however, (A) thermoplastic polymer powder comprising an acrylic triblock copolymer (I) and (B) the thermoplastic polymer powder obtained by an underwater cutting process as defined in the pending claims.

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Therefore, the amended claims are not anticipated by or obvious over Such et al. (US2006/10223936). Withdrawal of the rejection is requested.

The rejections based on Uchiumi et al. (US6,329,480) are respectfully traversed.

Uchiumi describes a process for the preparation of an acrylic acid ester polymer that includes polymerizing an acrylic acid ester or block copolymerization of an acrylic acid ester and another (meth)acrylic monomer in the presence of an organolithium compound and an organoaluminum compound. Uchiumi in Examples 14 and 15 describes diblock copolymer and triblock copolymer having an acrylate ester block and a methacrylate ester block(see ABSTRACT and Example 14 and 15 of U56,329,480).

This is not, however, (A) thermoplastic polymer powder comprising an acrylic triblock copolymer (I) and (B) the thermoplastic polymer powder obtained by an underwater cutting process as defined in the pending claims.

Therefore, the amended claims are not anticipated by or obvious over Uchiumi et al. (US6,329,480). Withdrawal of the rejection is requested.

The obviousness rejection combining Uchiumi et al. (US6,329,480) with Hisaka et al. (U55,308,699) is traversed as well.

As discussed above, Uchiumi et al. neither describes nor suggests (A) thermoplastic polymer powder comprising an acrylic triblock copolymer (I) and (B) the thermoplastic polymer powder obtained by an underwater cutting process as defined in the pending claims. Hikasa is relied upon to teach a thermoplastic elastomer in powder form with certain properties (see p. 7 of the Action).

Hisaka does not disclose the thermoplastic polymer powder comprising an acrylic block copolymer (I) as defined in the claims.

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Hisaka also does not describe that the thermoplastic polymer powder is obtained by an underwater cutting process.

Further, with respect to new Claim 13 Hisaka describes that the elastomer composition is pulverized by the freezing pulverization method using liquid nitrogen, and pellets of the elastomer composition cooled to a pulverizing temperature of -40°C or lower, preferably -70°C or lower, more preferably -90°C or lower, can be obtained by the mechanical pulverization method using a hammer mill, a pin mill etc (see col. 7, lines 10-17 of Hisaka).

Further, Hisaka discloses that if the composition is pulverized at a temperature higher than -40°C, the particle sizes of the pulverized elastomer powder are coarsened, and thus the powder slush moldability is undesirably lowered, and also preferably a pulverization apparatus which is cooled by an external cooling source is employed (see col. 7, lines 18-27 of Hisaka).

Thus, Hisaka does not describe the underwater cutting process at a temperature of about 80°C (see Claim 13).

Therefore, the amended claims are not obvious in view of Uchiumi and Hisaka.

Withdrawal of the rejection is requested.

Allowance of the pending claims is requested.

Respectfully submitted,

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